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DATE: February 15, 2002

Memo

TO:

RHIC E-Coolers

FROM:

Ady Hershcovitch

SUBJECT: Minutes of the February 15, 2002 Meeting

Present: Ilan Ben-Zvi, Michael Harrison, Ady Hershcovitch, William MacKay, Satoshi Ozaki, Triveni Srinivasan-Rao, Thomas Roser, Dejan Trbojevic, Dong Wang, Jie Wei, Vitaly Yakimenko.

Topics discussed: Electron Gun, Funding, Simulation & Calculations.

Electron Gun: after the February 7th, 2002, visit by Joe, Chien-Ih, and Ady to AES, Ady suggested an outside "design review" (during phase II) before "cutting metal." Ilan indicated that it should be referred to a "consultation." Dejan recalled that the AES presentation should be soon before the end of the SBIR phase I. In the February 7th, 2002, it was concluded that the perceived physical interference of the cooling pipes with the solenoids can be resolved. Since it would be beneficial to conclude the SBIR phase I with a design that shows the solenoids, **Ilan promised to organize a meeting to resolve the interference issue**.

Funding: to assist AES in securing SBIR phase II funding, BNL should provide a statement, signed by Derek Lowenstein, that BNL will provide AES with photo-cathode, test facility (i.e., 939), beam transport elements, and RF power. The statement must be properly included in the SBIR phase II proposal. Waldo indicated that TECHX, like AES, has a SBIR phase I that is nearing completion. The SBIR is for simulations that connect well to our tools. It should be nearing phase II submission. Thomas pointed out that DOE is encouraging submission of RHIC E-Cooling related SBIR phase I proposals to Nuclear Physics.

Mike resubmitted LDRD's for solenoid development and for magnetic field measurements. Vitaly identified a wavelength adequate for optical stochastic cooling in RHIC, for which he plans to submit a "small" LDRD.

Ilan plans to submit a \$1.3M proposal for a high intensity electron gun development to program development.

Simulation & Calculations: Mike pointed out that DOE funded a code development for SNS that may be of interest to RHIC E-Cooling. The resulting code is PARMTECH, which is a combination of PARMELA and the new physics from the French code TOUTARIS.